

Notice of Allowability

Application No.

10/668,444

Examiner

Irakli Kiknadze

Applicant(s)

HSIEH ET AL.

Art Unit

2882

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to the Amendment filed 6/22/2006.
2. ☒ The allowed claim(s) is/are 1-11 and 13-22.
3. ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some* c) ☐ None of the:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

* Certified copies not received: _____.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.

THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

4. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
5. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
- (a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached
- 1) ☐ hereto or 2) ☐ to Paper No./Mail Date _____.
- (b) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date _____.
- Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).
6. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

1. ☐ Notice of References Cited (PTO-892)
2. ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3. ☒ Information Disclosure Statements (PTO-1449 or PTO/SB/08), Paper No./Mail Date 10/6/2005
4. ☐ Examiner's Comment Regarding Requirement for Deposit of Biological Material
5. ☐ Notice of Informal Patent Application (PTO-152)
6. ☐ Interview Summary (PTO-413), Paper No./Mail Date _____.
7. ☐ Examiner's Amendment/Comment
8. ☒ Examiner's Statement of Reasons for Allowance
9. ☐ Other _____.

IK

DETAILED ACTION

1. In response to the Office action dated March 24, 2006 the Amendment has been received on June 22, 2006.

Claims 13-15 have been amended.

Claim 12 has been canceled.

Claims 1-11 and 13-22 are currently pending in this application.

Allowable Subject Matter

2. Claims 1-11 and 13-22 are allowed.

3. The following is a statement of reasons for the indication of allowable subject matter:

With respect to claim 1, prior art fails to teach or make obvious a method for data acquisition comprising an adjusting an initial estimate according to an accuracy of estimates performed on at least one of a nearest pair of neighboring detector rows, wherein each member of the pair of rows is an equal distance above or below the detector row with the malfunctioning cell, where at least one of the members has a good cell as claimed in combination with all elements of the claim 1. Claims 2 and 3 are allowed by virtue of their dependence.

With respect to claim 4, prior art fails to teach or make obvious a method for data acquisition comprising an adjusting step calculating a weight average of estimates from the pairs of neighboring detector rows as claimed in combination with all elements of the claim 4. Claims 5-11 are allowed by virtue of their dependence.

With respect to claim 13, prior art fails to teach or make obvious a method for error detection an image array comprising measuring a difference between a first reading from a detector cell and at least second and third readings from neighboring cells; and using the difference between the first, second, and third readings to identify a malfunctioning cell as claimed including all of the limitations of the claim 13. Claims 14 and 15 are allowed by virtue of their dependence.

With respect to claim 16, prior art fails to teach or make obvious an imaging system comprising an image processing system, wherein the image processing system adjusts the signal based on a weighted average of first and second difference signals produced using the method of interpolation with at least two neighboring rows in the image detector array in the projection view as claimed in combination with all elements of the claim 16. Claims 17-20 are allowed by virtue of their dependence.

With respect to claim 21, prior art fails to teach or make obvious a method for reducing errors in image data acquisition comprising: identifying at least one of a malfunctioning channel and malfunctioning an application specific integrated circuit (ASIC) and applying a correction scheme to reduce an error due to the at least one of the malfunctioning channel and a malfunctioning ASIC as claimed in combination with all elements of the claim 21. Claim 22 is allowed by virtue of its dependence.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Conclusion

4. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Liu (US Patent 6,118,846) teaches a process and associated apparatus for performing defective pixel correction in a radiation detector having plurality of radiation sensors arrayed in rows and columns (see abstract). Mendis et al. (US Patent Application Publication 2005/0030394 A1) teaches recording addresses of bad pixels and replacing the bad pixel value by another value (see abstract).

5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Irakli Kiknadze whose telephone number is 571-272-2493. The examiner can normally be reached on 9:00-5:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Ed Glick can be reached on 571-272-2490. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 2882

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Irakli Kiknadze
July 14, 2006

IK


EDWARD J. GLUCK
SUPERVISORY PATENT EXAMINER